

PATENT ABSTRACTS OF JAPAN

(11)Publication number : 2000-017099

(43)Date of publication of application : 18.01.2000

(51)Int.Cl. C08J 9/28
B32B 7/02
B32B 27/30
C08F 20/22
C08G 59/02
G02B 1/11
// C08J 7/06

(21)Application number : 10-190245

(71)Applicant : TORAY IND INC.

(22)Date of filing : 06.07.1998

(72)Inventor : NAKAKIMURA AKITOSHI
KONDO TETSUJI
OKA KOICHIRO

(54) THIN FILM AND ANTIREFLECTION FILM USING THE SAME

(57)Abstract:

PROBLEM TO BE SOLVED: To prepare a thin film having micro voids and an excellent antireflection property by preparing a film comprising a binder resin which contains a fluorine compound and an organic silicon compound as main components and a small particle.

SOLUTION: As a fluorine compound, one having at least two polymerizing functional groups is preferable. An organic silicon compound, $\text{Si}(\text{R}_1)_i(\text{R}_2)_j(\text{R}_3)_k(\text{OR}_4)_{4-(i+j+k)}$ (wherein R_1 , R_2 and R_3 are each an organic group having at least one of H, O and F; R_4 is an aliphatic, an alicyclic or an aromatic residue; i , j , k are each 0 or 1) is preferable. As a small particle, an inorganic oxide containing an element selected from Si, Al, Sn, Sb, Zn and Ti and an emulsion particle of magnesium fluoride, calcium fluoride or an organic compound can be used, but inorganic small particles are preferable. Usually 5-200 pts.wt. of a small particle is used against 100 pts.wt. of a binder resin. A thin film is obtained by dispersing or dissolving small particle and a binder and carrying out coating.

LEGAL STATUS:

[Date of request for examination] 06.07.2005

[Date of sending the examiner's decision of rejection]

[Kind of final disposal of application other than the examiner's decision of rejection or application converted registration]

[Date of final disposal for application]

[Patent number]

[Date of registration]

[Number of appeal against examiner's decision of rejection]

[Date of requesting appeal against examiner's decision of rejection]

[Date of extinction of right]